

Interactive Data Public Test Suite

Version 35-160213

1 Goals

The purpose of the public test suite is to assist developers of software that must validate Interactive Data prior to its submission to EDGAR. The test suite consists of many small Interactive Data instances, schemas and linkbases that are categorized as to whether they violate a validation check, and if so, what validation check they violate and whether that would result in a warning, or in an error that would cause the Interactive Data to be rejected.

Filers that attach Interactive Data Exhibits to EDGAR submissions are responsible for compliance with all validations in Chapter 6 of Volume II of the EDGAR Filer Manual ("the Manual"). Automated validation by preparation software can make it more efficient for filers to verify compliance before sending their filings to EDGAR itself. Nothing in this test suite is intended to create new requirements or change existing requirements for EDGAR submissions; filers should consult the Commission rules and the Manual for submission requirements.

The organization of the test suite follows that of Chapter 6 of the Manual. Chapter 6 consists of subsections that each detail one or more Interactive Data validations, and these individual subsections are grouped into sections according to type of attachment (instance, schema, or linkbase) and whether the validations can be completely automated (called "syntax" sections) or whether they deal with the relationships that may require some manual review or accounting judgment (called "semantic" sections).

1	Goals.....	1
2	Notation.....	2
3	Versions.....	2
4	Installation.....	2
5	Library.....	2
6	Test Cases	3
6.1	Required elements <creator>, <name> and <email>	3
6.2	Required element <number>	4
6.3	Required element <name>	4
6.4	Required element <description>	4
6.5	Optional repeating element <reference>	4
7	The <variation> element	4
7.1	Required attribute @id of <variation>	4
7.2	Required element <name> of <variation>	4
7.3	Required element <description> of <variation>	5
7.4	Optional repeating element <reference> of <variation>	5
7.5	Required element <data> of <variation>.....	5
7.6	Required element <instance>.....	6
7.7	Optional attribute @exhibitType of <instance>	6
7.8	Optional repeating element <linkbase>	6
7.9	Required repeating element <schema>	6
7.10	Required element <result>	7
7.11	Optional repeating element <assert>	7
8	The <assert> element	7
8.1	Required attribute @severity of <assert>	7

8.2	Required attribute @num of <assert>	7
8.3	Required attribute @name of <assert>	7
8.4	Optional attribute @frd of <assert>	7
8.5	Optional attribute @countSatisfied of <assert>	7
8.6	Optional attribute @countNotSatisfied of <assert>	7
9	Notes on the folder structure and file details.....	8
10	Notes on 6.16 Definition Syntax Subsections	9
11	Contacts	11
12	Index	11
13	Change Log	11

2 Notation

In this document, path names use forward slashes, although the tests work on any operating system.

3 Versions

The major version number "35" refers to a specific version of Manual (draft or otherwise) and the minor version number "160213" is the date of the minor version, formatted as YYYYMMDD.

4 Installation

The suite is distributed as a zip format archive. Extract the entire contents to any convenient location, preserving folder paths. It contains a top level folder that corresponds to the version of the Manual.

All files are encoded as 8-Bit Universal Transmission Format (UTF-8) or US ASCII. The suffix ".xsd" indicates an XML Schema file, ".xsl" indicates an XML Style Sheet (XSL) and suffix ".xml" indicates any other XML file type.

There are no executables in the zip format archive except for XSL 1.0 files in subfolders "lib" and "conf".

The file index.htm is a file created to facilitate browsing the test files; it highlights testcase files containing remarks that may help developers.

5 Library

The folder "lib" contains an XML Document Type Definition (DTD) and three XML Entity Declaration (ENT) files used to validate the un-escaped content of Text Blocks and XBRL Footnotes.

A Text Block is an XML element whose type is "textBlockItemType" in a namespace starting with "http://xbrl.us/us-gaap/".

An XBRL Footnote is an XML element named "footnote" in namespace "http://www.xbrl.org/2003/linkbase".

Files test.xsd, testcases.xsl and test.xsl are used to validate and view *-testcase.xml files in a browser, respectively. The elements are all in the http://edgar/2009/conformance namespace.

File errors.xml is a list of all error codes. File xbrlerrors.htm is the equivalent file in HTML for publication on the SEC web site.

6 Test Cases

A testcase file is an XML file used by software developers. The file names sets of files to be processed together and the expected results of that processing. The testcase XML file is typically transformed to produce a shell command script; the resulting command script invokes a validator on one file in each variation and stores the result of that validation. When a validator produces results identical to those expected, it is said to be "conforming".

All testcases and their test files are in the "conf" folder. The testcases are grouped by section with a sort code scheme that corresponds to the number and title of the section, for example:

- Section 6.4 = Folder 604-filing-semantics
- Section 6.5 = Folder 605-instance-syntax

Within each section folder are subsection folders, following a similar coding scheme, for example:

- Section 6.5.1 = 605-instance-syntax/605-01-identifier-scheme
- Section 6.19.1 =
619-reference-semantics/619-01/619-01-no-standard-references

Within each subsection is one testcase file whose name is prefixed the same as the folder. For example:

- 605-instance-syntax/605-01-identifier-scheme/603-09-identifier-scheme-test case.xml

Sections 6.24 and 6.25 of the filer manual are nested with an additional level of folders to distinguish "good" from "nogood" samples. For example, the "good" variations of Section 6.24.2 are described here:

- 624-rendering/02-contexts/gd/02-contexts-testcase.xml

It contains references to sample instances each in a different subfolder:

- 624-rendering/02-contexts/gd/000gd/r02000gd-20081231.xml
- 624-rendering/02-contexts/gd/001gd/r02001gd-20081231.xml

The syntax of the testcase is a modification of the syntax typically used by the XBRL International consortium (<http://xbrl.org>) and so it retains some features that are not meaningful for this test suite. The schema at lib/test.xsd is for validating the syntax of each testcase.

Each testcase file is XML that meant to be used for programming test harnesses and similar applications. Each testcase file also has an XML Processing Instruction referring to an XSL 1.0 style sheet lib/test.xsl for viewing it as HTML in a browser.

The numbering of Manual sections is stable. The number and meaning of subsections will not change except to add additional subsections, or to mark subsections as "deleted" "reserved" or equivalent language.

6.1 Required elements <creator>, <name> and <email>

These elements name the party responsible for the testcase, which for this test suite is always the Office of Structured Disclosure (OSD) at the SEC.

6.2 Required element <number>

By convention this is the sort code pattern "6[0-9]{2}-[0-9]{2}", the sort code for a section as described above. "605-22" means section 6.5.22.

6.3 Required element <name>

The schema restricts this to contain a specific string that provides a human-readable reference back to the Manual:

- EDGAR Filer Manual v{version} 6.{section}.{subsection} page 6-`{page}`

6.4 Required element <description>

This element has the plain text of the corresponding section of the Manual (usually the entire heading and body, but not tables), but only for reference; the Manual is normative.

This element also sometimes contains parenthetical additions such as (REMARK ...) that indicates some implementation detail or related commentary, or a (TODO ...) that indicates a known coverage gap or other deficiency in a draft version.

6.5 Optional repeating element <reference>

There can be any number of reference elements but each must have attribute @specification containing any useful string.

7 The <variation> element

Each test case contains one or more variations. Each variation exposes just one aspect of the validation to be performed: either a "no good" variation that is meant to trigger exactly one validation error, or sometimes a "good" variation that is meant to illustrate either the base case or an edge case.

7.1 Required attribute @id of <variation>

By convention, this is in the format "_[0-9]{3}((gd)|(ng))" in which "gd" always indicates a good (valid) variation and "ng" indicates a no good (invalid or triggering a warning) variation.

Concatenating the character "e", the testcase number, and the portion of the @id occurring after the underscore, results in the base name of the files unique to that variation. For example, if the test number is 604-05 and there is a variation named "_003gd" then there will be data files with base name e60405003gd.

The three digit number [0-9]{3} is often a zero based sequence, but may have gaps or some other iteration pattern.

The numbering and meaning of individual variations within a testcase may change from release to release, although this is expected to be rare.

7.2 Required element <name> of <variation>

This contains free form plain text although by convention it begins with the section number and ends with either the token GOOD or NOGOOD. For example, these are the names of variations in 605-01-entity-identifier-scheme:

- 6.5.1, Scheme in instance is <http://www.sec.gov/CIK>, GOOD
- 6.5.1, Scheme in instance is <http://www.sec.gov>, NOGOOD

7.3 Required element <description> of <variation>

This contains free form plain text; again by convention it often duplicates the name element contents without the numeric prefix, and is always brief.

7.4 Optional repeating element <reference> of <variation>

There can be any number of reference elements but each must have attribute @specification containing any useful string.

7.5 Required element <data> of <variation>

The data element groups the Interactive Data files in the variation. This has instances, linkbases, and schemas. Although in principle the set of local files in the Discoverable Taxonomy Set (DTS) of the instance is discoverable from the instance, the testcase files also serve as a kind of manifest to ensure a set of files is complete without extraneous content.

The DTS is described in detail along with other XBRL constructs in the XBRL 2.1 Specification at:

<http://www.xbrl.org/Specification/XBRL-2.1/REC-2003-12-31/XBRL-2.1-REC-2003-12-31+corrected-errata-2013-02-20.html>

7.5.1 Optional repeating element <parameter> of <data>

Sometimes, validation requires an external input. For example, EDGAR uses the Central Index Key (CIK) number to identify filers.

For example, variations in testcase 605-02-entity-identifier-match-cik requires that the CIK of the submission be provided as a parameter to the validation of an instance.

7.5.2 Required attribute @name of <parameter>

A QName that is the name of the parameter. In this test suite the QName content must have the empty namespace.

7.5.3 Required attribute @datatype of <parameter>

A QName that is the datatype of the parameter, usually xs:string.

7.5.4 Required attribute @value <parameter>

A string that is cast to the datatype specified and passed to the validator.

7.5.5 Parameter names, types and values currently in use

Only "submissionType", "cikList", and "cikNameList" are currently used. If <parameter> is not specified, a validator being tested can use the following default values, or skip validation rules that require unspecified parameters:

@name	@datatype	default @value appearing in test instances
submissionType	xs:string	8-K
cikList	xs:string	9876543210
cikNameList	xs:string	Variation basename, e.g. "e60512000gd".
forceUtrValidation	xs:boolean	false

Testcase e60524 uses parallel lists of CIK and entity names. The delimiter for cikList is the comma character “,” and the delimiter for cikNameList is the seven character sequence “|Edgar|”. Thus the following elements declare that the first CIK has company name “ABC & DEF LLC” and the second has company name “THIS\STR@NGE N#ME=;.”

```
<conf:parameter xmlns:conf="http://edgar/2009/conformance" xmlns=""
  name="cikList" datatype="xs:string"
  value="9876543210,3333333333"/>
<conf:parameter xmlns:conf="http://edgar/2009/conformance" xmlns=""
  name="cikNameList" datatype="xs:string"
  value="ABC & DEF LLC|Edgar|THIS\STR@NGE N#ME=;."/>
```

Testcase e60535 uses the parameter forceUtrValidation set to true, so that each instance will be validation with Unit Type Registry validation enabled no matter whether the instance DTS contains element “UTR” in a standard namespace.

7.6 Required element <instance>

The local file name of the instance must be an EDGAR compliant file name (less than 24 characters, etc). By convention the name is formatted as:

e6{section}{section}[0-9]{3}((gd)|(ng))-200(8|9)1231.xml

For example e60501001ng refers to a no good instance violating Manual section 6.5.1.

By convention, instances that have the date part 20081231 use the 1.0 DEI taxonomy and those with date part 20091231 use the 2009 DEI taxonomy.

The attribute @readMeFirst must be “true”. This attribute indicates to a test script that it is the instance file that is first opened by the validator being tested.

7.7 Optional attribute @exhibitType of <instance>

The exhibitType is a normalized string that defaults to and must be one of the exhibit types that names an XBRL instance, including:

EX-100	
EX-101	(This is the default value)
EX-99.K SDR	
EX-99.L SDR	

7.8 Optional repeating element <linkbase>

Every variation has linkbases named using the same naming convention as the instance.

Many testcase variations have a set of common linkbases named edgar-20081231_*. * or edgar-20091231_*. *. Identically named “edgar-” linkbase files differ from folder to folder.

7.9 Required repeating element <schema>

Every variation has at least one schema with its own set of linkbases named using the same naming convention as the instance.

Usually a variation has exactly one schema. Rarely, in section 608-schema-syntax or elsewhere, the nature of the testcase may necessitate more than one schema.

Many testcase variations have a set of common schemas named edgar-20081231.xsd, edgar-20091231.xsd or edgar-20111231.xsd. Identically named "edgar-" files may differ from folder to folder.

7.10 Required element <result>

For a "no good" variation the result element contains at least one <assert> element. The element is otherwise empty.

7.11 Optional repeating element <assert>

The assert element contains information used to group information about the error or warning message expected upon validation.

8 The <assert> element

The assert element declares the severity, associated EFM section and mnemonic error code to be generated. The element allows any other attributes to appear that the author of the variation may deem useful¹.

8.1 Required attribute @severity of <assert>

There are two values, the most common one being "err" and the other "wrn" meaning a warning. In the EDGAR system, a warning does not cause the XBRL files to be stripped from a submission; an error does.

8.2 Required attribute @num of <assert>

The syntax is the same as the <number> element content without the dash. It is not identical because in rare cases the @num may differ from the testcase file where it appears, as for example when one error could not occur without triggering another.

8.3 Required attribute @name of <assert>

A mnemonic code with dash-separated proper case tokens such as "No-Presentation-Order". Tokens are strictly proper case, for example, "No-Xml-Base-Allowed" even for the error concerning attribute "xml:base", or "Illegal-Html" for errors concerning HTML.

8.4 Optional attribute @frd of <assert>

A two-letter code for a related group of assertions; this appears in error codes as reported by EDGAR, such as "60515-cp-No-Xml-Base-Allowed".

8.5 Optional attribute @countSatisfied of <assert>

Defaulting to 0, this indicates the number of satisfied assertions in the variation.

8.6 Optional attribute @countNotSatisfied of <assert>

Defaulting to 1, this indicates the number of assertion violations in the variation.

¹ The syntax of <assert> is syntactically convertible to that used by the XBRL International Formula 1.0 Specification (<http://www.xbrl.org/SpecRecommendations/>).

9 Notes on the folder structure and file details

There are a few exceptions to the mapping from Manual subsections to the test suite. There are no test cases for sections of the manual marked "Reserved".

At this time, there is incomplete coverage of these syntax sections of the Manual:

- 603-filing-syntax (some subsections require information such as the attachment type (EX-100, EX-101) that is not available from the content of the XBRL files themselves).
- There are no separate tests for 605-06, 605-18, 605-26, 607-02, 607-05, 607-06, 609-02, 609-08, 610-07, or 612-04 because these sections do not have their own unique error codes.

Two files in folder 603-04-no-html-character-entities are not well-formed XML; this is intentional (e60304001ng, e60304002ng-20081231_lab.xml).

There is no coverage of these semantic sections because they do not at this time result in EDGAR warning or error messages:

- 606-instance-semantic
- 608-schema-semantic
- 611-label-semantic
- 613-presentation-semantic
- 615-calculation-semantic
- 617-definition-semantic
- 619-reference-semantic

There are no such subsections 6.22.1, 6.22.2, or 6.22.3 in the Manual; these correspond, respectively, to the three issues covered by section 6.22 and the current contents of the <http://www.sec.gov/info/edgar/edgartaxonomies.xml> file.

Form SDR appears in the EDGAR Filer Manual in Chapter 9. Form SDR differs from other forms because it allows for multiple XBRL instances, requires different exhibit names (EX-99.K SDR.INS, for example, instead of EX-101.INS), and several other .txt and .xml attachments. Test variations specific to Form SDR are in a separate folder and have names that point back to the main test case file in Chapter 6. For example, the test variations specific to Form SDR that are a continuation of 6.3.2 are in this file:

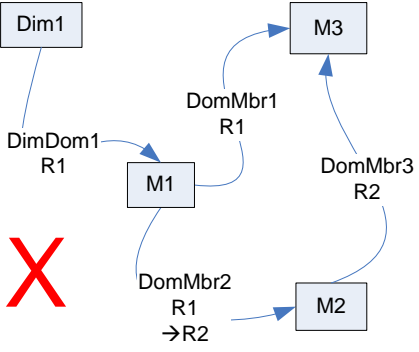
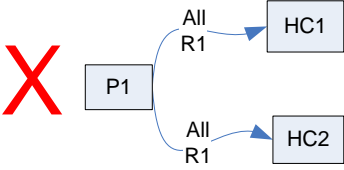
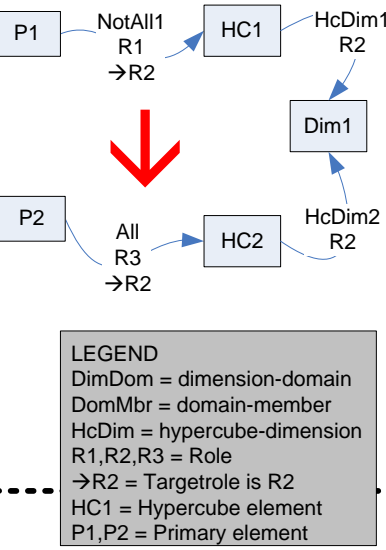
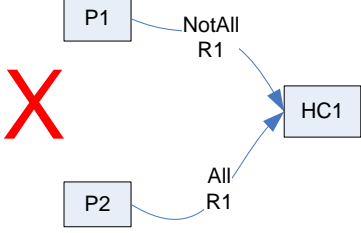
- 902-sdr/60302-sdr-doctype/902-sdr-60302-sdr-doctype-testcase.xml

The child elements of <data> point to separate subfolders for each variation, for example:

```
<variation id="_002gd">
  <name>The minimal valid SDR filing.</name>
  <description>An SDR devoid of content with one K SDR and no L SDR (Exhibit L marked as "not applicable" in Submission Header).</description>
  <data>
    <conf:parameter xmlns="" value="SDR" name="submissionType" datatype="xs:string"/>
    <instance readMeFirst="true" exhibitType="EX-99.K SDR">002gd/k60302002gd-20151231.xml</instance>
```


10 Notes on 6.16 Definition Syntax Subsections

Subsections 6.16.4, 6.16.6, 6.16.7, and 6.16.8 can be difficult to interpret without further technical explanation. Their test cases are illustrated and explained in the figure below.

	Section text	X Disallowed → Required	Remarks
6.16.4	<p>6.16.4 The xlink:arcrole attribute 'http://xbrl.org/int/dim/arcrole/domain-member' and 'http://xbrl.org/int/dim/arcrole/dimension-domain' must have no undirected cycles in any Directed Relationship Set as defined in XBRL Dimensions 1.0.</p>		<p>This is called "no tangled domains". It applies to every DRS starting from a DimDom relationship.</p> <p>DimDom relationships in different base sets can never be the source of a violation of this rule.</p>
6.16.5	<p>6.16.5 The DTS of an instance must contain in each base set, for each source element, at most one effective relationship with an xlink:arcrole attribute equal to 'http://xbrl.org/int/dim/arcrole/all'.</p>		<p>This was intended to prevent unioning of hypercubes so as to simplify other constraints.</p> <p>Because of primary item inheritance, this rule only rules out the simplest violations.</p>
6.16.7	<p>6.16.7 An axis of a negative table must appear in a positive table in a definitionLink having an equal value of xlink:role. An Axis cannot appear as an Axis of a negative hypercube (that is, axis excluded from a table) unless there are members of that Axis in a positive table. Formally, an axis element that is the target of an effective relationship with arcrole equal to 'http://xbrl.org/int/dim/arcrole/hypercube-dimension' that is consecutive from a relationship with arcrole 'http://xbrl.org/int/dim/arcrole/notAll' must also be the target of an effective relationship in a link:definitionLink having the same value of xlink:role and which itself is consecutive from an effective relationship with xlink:arcrole attribute equal to 'http://xbrl.org/int/dim/arcrole/all'.</p>	 <div style="border: 1px solid black; padding: 5px; margin: 10px 0;"> <p>LEGEND DimDom = dimension-domain DomMbr = domain-member HcDim = hypercube-dimension R1,R2,R3 = Role →R2 = Targetrole is R2 HC1 = Hypercube element P1,P2 = Primary element</p> </div>	<p>This rule is intended to ensure that the notAll relationship does not forbid members of a dimension that is not even relevant to a hypercube.</p> <p>DomMbr relationships between P1 and P2 are not relevant, since neither all nor notAll are ever consecutive from DomMbr.</p> <p>Note that the rule assumes, but does not require, that the target roles on HcDim1 and HcDim2 are different, so that the members of Dim1 are different in HC1 and HC2.</p>
6.16.8	<p>6.16.8 The target of an effective relationship with an xlink:arcrole attribute equal to 'http://xbrl.org/int/dim/arcrole/notAll' must not be the target of an effective arc with an xlink:arcrole attribute equal to 'http://xbrl.org/int/dim/arcrole/all' in link:definitionLink elements having equal values of xlink:role. This rule ensures that a Table (hypercube) is not both positive and negative.</p>		<p>This rule complements 6.16.7 by ensuring that HC1 and HC2 are distinct.</p> <p>The combination of this constraint, 6.16.4, and XBRL Dimensions 1.0 constraint's prohibition of undirected cycles in HcDim relationships prevents using @targetRole to give the same HC element different members of the same axis.</p>

11 Contacts

Developers with questions, bug reports, or suggestions for additional variations to improve coverage should contact StructuredData (at) sec.gov

The SEC cannot guarantee a response to every communication. Before sending a bug report, check for the latest version and check the Interactive Data FAQ (<http://www.sec.gov/spotlight/xbrl/staff-interps.shtml>).

12 Index

CIK, 5	testcase, 3
DEI taxonomy, 6	Text Block, 2
DTD, 2	UTF-8, 2
DTS, 5	variation, 4
ENT, 2	XBRL Footnote, 2
Manual, the, 1	XSL, 2
OSD, 3	

13 Change Log

Version	Changes
13-090917	-
13-091021	<p>Change of namespace to http://edgar/2009/conformance. Addition of index.htm, testcases.xml, and errors.xml.</p> <p>Improved alignment of error codes listed in xbrlerrors.htm and the error codes in the testcase files. Change of @num on e60502000ng to agree with others in the same file.</p> <p>edbody.dtd: attribute 'cite' is no longer allowed on element 'blockquote'.</p> <p>Remark added to e61404 due to discrepancy between wording in the manual and results of variation 007gd.</p> <p>Remark added to e61006 to clarify the 'normalized string' requirement.</p> <p>Three new variations in e60516 to exercise validation of HTML text block bodies against the DTD.</p> <p>These test variations were corrected so that they are more likely to produce only the error being tested:</p> <p>e60306101ng e60306103ng e60502001ng e60502003ng e60523001ng e60523002ng e60903016gd e60904000gd</p>

Version	Changes
	e60904001ng e60907001ng e61003002ng e61003003ng e61004001gd e61004003ng e61403000gd e61404003gd e61602000gd e61603001ng e61604001ng e61604006gd e61604009gd e61608001gd e61609000gd e62202033ng
13-091128	testcases.xml: removed references to nonexistent folders. e61403000gd: removed as unnecessary. e603061**: removed because redundant with e622***** variations. e603064**: removed because redundant with e622***** variations. e603115**: removed because redundant with e622***** variations. e60403004ng: corrected redundant labels. e60502001ng, e60502002ng: corrected irrelevant facts in instance. e61006002ng: corrected redundant labels. e61609000gd: corrected so as not to have ineffectual arcs. edbody.dtd: corrected to disallow attributes cite, char, and charoff for consistency with EFM 5.2.2.2. e60516013ng, e60516014ng: corrected redundant labels. 605-16-html-limited-testcase.xml: Corrected namespace and corrected e60516015ng and e60516016gd for consistency with edbody.dtd e60709: added variation e60709000gd to cover mark characters and variation e60709002ng to cover case-sensitivity.
13-091201	e60403005ng and e60403006ng added to catch XBRL 2.1 validity.
13-100104	Removed spurious <err> element from variation e60709000gd.
13-100303	Removed e61602 because it is redundant with Dimensions 1.0.
14-100405	Moved dei:EntityCommonSharesOutstanding tests from e60521 to e60526; warning conditions changed but code name unchanged. Renumbered e60520, e60521 variations and removed their dependence on the us-gaap 2008 element schema. Removed e60531 which required an order attribute on footnoteArc and removed error du-0531-Footer-Relationship-Order from xbrlerrors.htm. Updated e6220{1,2,3,4} to test for taxonomy RR 2010. Changed all dei:DocumentType contents to 8-K except in e605** test cases where dei:DocumentType is relevant to the rule. Tests e60511 corrected to remove unused unit declarations and added facts to use all declared units. *-testcase.xml: Updated to have XHTML-formatted equivalent of EFM v14 DRAFT contents. Added lib/descriptions.htm consolidating the

Version	Changes
	HTML version of all rules in the suite.
14-100406	e60704007ng: content corrected to use invalid ISO date "2009-9-12". e60403007gd: added Dimensions 1.0 common domain test.
14-100409	e60521***: Removed stray N-1A document type occurrences. /lib folder: From http://www.sec.gov/info/edgar/ folder, added edgartaxonomies.xml and erxl.xsd.
14-100630	e60515005gd: DocumentType set to 8-K to avoid 6.5.26 violation. e60530000ng: DocumentType set to 8-K to avoid 6.5.26 violation. e60703: added missing <assert> elements to variations. e60703006ng: added 'xbrl.sec.gov' to reserved authority names. e60903017gd: Changed URI to not violate a 'should' condition in 6.7.9. e6100600*: DocumentType set to 8-K to avoid 6.5.26 violation. e6100800*: DocumentType set to 8-K to avoid 6.5.26 violation. e61603: Added remark regarding the need to evaluate with respect to primary items, not just presence of dimensions. e62202033ng, e62202054ng: Corrected Schema and XBRL 2.1 errors. e62203024ng, e62203034ng: Cases covering RR 2010 taxonomy.
16-110210	For all variations in all test cases, removed unnecessary units, facts, and unnecessary dependencies on us-gaap taxonomy schemas. edgartaxonomies.xml: add XBRL International recommended roles, arc roles and types e60403: add variation 011ng formerly e60901001ng e60510: add variation clarifying that an instance has to be 24 hours and 1 second or more after the start of any duration e60510: correct testcase file which had incorrect files included e60515: new variations covering nonnum:textBlockItemType e60516: add variation for when an xmlns attribute appears e60523: add variation 004ng to test parameter – cik mismatch e60535: new test case and variations for new section e60713: add variation for fact-explanatoryFact e60714: remove variation 000gd e60728: new variations covering nonnum:domainItemType e60728: update to match edgartaxonomies.xml namespace authorities e60722: removed e60703: reflect changes in edgartaxonomies.xml e60704: reflect changes in edartaxonomies.xml e60901: move variation 001ng to e60403 as an xlink-level validation e60903: remove files not needed in variations 000, 004, 011 – 016 e60904: remove 000gd and files not needed e61005: remove redundant variations for namesepace authorities e61604: add variations 014 – 018, removing 010 for clarification e61604: remove 'good' variations 006, 007, 008, 009 e61604: add 'nogood' variations 010, 011, 012, 013 e61605: use rr 2008 in preference to ici 2006 lib/error.xml: add error codes Many schemas: add elementDefaultForm='qualified' Many instances: change units for better alignment with forthcoming XBRL International Unit Type Registry Many files: change to encoding="US-ASCII"
16-110225	Added detail in the 'Library Files' section of this document about the edgartaxonomies.xml file and others.

Version	Changes
	<p>Corrected EntityRegistrantName to match variation name in some 30 instance files.</p> <p>e60703, e60716, e62201: clarify that these tests use local copy of edgartaxonomies.xml.</p> <p>e60311: correct variation 512ng to use a smaller set of linkbases.</p> <p>e60403: correct instance to match variation 009gd's intent.</p> <p>e60510: correct period date to avoid warning message.</p> <p>e60515, e60530, e61405: indicate where EFM has not yet been corrected to reflect validation intent. e60520: split variations into those which use 2008 dei taxonomy and those which use 2011 dei in which DocumentType is enumerated.</p> <p>e60521: remove EntityCommonSharesOutstanding variations.</p> <p>e60530: add remark confirming that EFM 16 has incorrect text.</p> <p>e60725: correct 001ng which had a schema validation error.</p> <p>e60728001ng: change context end date to avoid warnings.</p> <p>e60901: remove testcase entirely, it is now covered by e60403.</p> <p>e61203: correct variation 009 description.</p> <p>e62202, forbidden.xml: correct bad invest-doc linkbase reference.</p>
18-111004	<p>e60302, e60521: Make the order of attribute values in assert elements of test case files consistent, to facilitate comparisons.</p> <p>e60302001ng: correct bad namespace prefix declaration.</p> <p>e60305: add a variation 003gd containing all allowed EDGAR characters and a variation 004ng containing the disallowed no-break space character.</p> <p>e60306: edit explanatory text for change made in EFM v17.</p> <p>e60403: add variation 012gd for prefix 'dei' assigned to a namespace other than a dei namespace, variation 016ng to catch empty xlink:href attribute, and variations 013, 014, 015 to test handling of default and fixed attributes on fact values and decimals attributes.</p> <p>e60507001ng: remove dei:DocumentReportType which was deprecated</p> <p>e60512: remove facts of deprecated dei:DocumentReportType</p> <p>e60513: remove facts of deprecated dei:DocumentReportType</p> <p>e60514: change variations 001gd and 002gd to use en-US, add new variations 004ng and 005ng with the same instances, because those are now ng. Remove dei:DocumentReportType facts.</p> <p>e60515: add three variations 013gd, 014ng in which there is an xml comment in the middle of a text block.</p> <p>e60516: add variation 024ng in which xml comment interferes with testing of prohibited EDGAR content. Remove dei:DocumentReportType facts.</p> <p>e60519: in remarks, add 10-KT and 10-QT</p> <p>e60526: add variations covering 10-KT and 10-QT.</p> <p>e60530: remove remark that only applied to EFM v16. Change variation filenames to be like all other testcases.</p> <p>e60536: add new testcase for newly added rule EFM 6.5.36.</p> <p>e60704: remove redundant variation and renumber removing 008ng.</p> <p>e60717: add variation to ensure that id for x:y is not x_y27.</p> <p>e60721: use element type xbrli:decimalItemType to avoid redundancy with syntax detail embedded in semantic rule 6.8.17.</p> <p>e60727: change testcase description text to match EFM text.</p> <p>e60729: add testcase for new syntax rule 6.7.29.</p> <p>e60730: add testcase for new syntax rule 6.7.30.</p>

Version	Changes
	<p>e60903: correct typo in rule text.</p> <p>e61001: Add two new variations to test the heretofore untested case of a used fact (and member) with only an "en" language label.</p> <p>e61004: Change xml:lang of "fr" to "en" in variations to reinforce that the rule applies only to "en-US" labels. Remove empty definition linkbase from variation e61004001gd.</p> <p>e61405: add variation 012gd to make explicit "any other element". Remove remark regarding addition of the word "role" in the rule.</p> <p>e61603: correct capitalization in text of rule.</p> <p>e61604: add variation 019ng for tangled domain in primary items. Change phrase "Domain (or Member)" to "domain members". Remove empty presentation linkbase from variation 002gd.</p> <p>e62203: add text to description of testcase to clarify testcase intent.</p> <p>asserts.xml: add new file consisting of all variation assertions.</p> <p>descriptions.htm: updated with descriptions to match EFM v18.</p> <p>errors.xml: comment out error for e60722 and correct typo in 6.22.0</p> <p>testcases.xml, testcases.htm: update with 6.5.36, 6.7.29, and 6.7.30</p> <p>test.xsd: relax restriction in EDGAR file names to allow URI's ending in EDGAR file names. Allow additional elements "info" "result" and open content model to the "variation" element.</p>
18-111021	<p>e60403: edited text of rule to correspond with EFM text. Removed variation 009gd until such time the UTR validation trigger condition can be included correctly; see 6.5.35.</p> <p>e60515: added variations 014, 015, and 016 with additional comment placements in text blocks, and removed definition linkbases.</p> <p>e60516: added variations 025, 026, and 027 with additional comment placement in text blocks, and removed definition linkbases.</p> <p>e60729: removed definition linkbases as irrelevant to the testcase.</p> <p>e60730: removed variations in which targetNamespace contained two-byte characters. Removed definition linkbase as irrelevant to the test case. Edited remarks.</p> <p>e60526: added variations in which there are no definition links.</p> <p>e60534: added variations 5 and 6 in which quoted but disallowed HTML appears harmlessly as strings; removed definition links.</p> <p>e60535: added variation 999gd to make explicit that 6.5.35 is relevant only when element "DTS" appears in a standard namespace. Added remark that this means validators will not be able to distinguish the good from nogood variations until they are revised with a DTS element in a standard namespace. Removed all definition linkbases as irrelevant to the testcase.</p>
18-111122	<p>60305: Add variation 005ng with disallowed EDGAR circumflex (x5E).</p> <p>60403: Add variations 017gd and 018gd in which measures without namespaces are okay, and 019ng to test for gYear not 4 digits.</p> <p>60515: Use CDATA instead of ampersand quoting in text block.</p> <p>60516: Correct problem of missing text block text in 023ng. Use CDATA instead of ampersand quoting in text block.</p> <p>60520: Add 10-QT, 10-KT, POS AM to remarks</p> <p>60521: Add 10-QT, 10-KT to remarks and to variations</p> <p>60535: Add parameter forceUtrValidation to all variations but 999gd. Add documentation of forceUtrValidation to section 7.5.5 above.</p> <p>60536: Change variations using multibyte Unicode characters so as to use only 2-byte Unicode characters. Correct text to match final EFM</p>

Version	Changes
	<p>text. Correct variation 025ng description. 61202: Remove dependence of 000gd on edgar-20081231.xsd file. 62202: Correct missing imports.</p>
18-120102	<p>62201: Add us-gaap and sec 2012 taxonomies to edgartaxonomies.xml 62202: Change forbidden.xml list to include some 2012 entries 62203: Add cases of incompatibilities using 2012 namespaces.</p>
18-120228	<p>61006: Add variation 005ng for consecutive whitespace. 60509: Correct namespace binding for empty prefix on <parameter> 60510: Correct namespace binding for empty prefix on <parameter> 60520: Correct namespace binding for empty prefix on <parameter> 60521: Correct namespace binding for empty prefix on <parameter> 60523: Correct namespace binding for empty prefix on <parameter> 60524: Correct namespace binding for empty prefix on <parameter> 60535: Correct namespace binding for empty prefix on <parameter> 60904: remove unnecessary <parameter> element</p>
22-130110	<p>lib/test.xsd: Allow an <image> input to a variation and allow uppercase characters and repetitions of underscore and dashes in file names, as EDGAR now allows. e60303: New test case covering valid file names e60306: Remove dependence on dei 2009 linkbases. e60403019ng: Change variation file names to 2012 e60403020ng: New variation tests for missing preferred label. e60403: Update all dei-2011 to dei-2012. e60509, e60510: Simplify linkbase files used e60509, e60510: replace document type 'Other' with '497' e60509008gd: New variation making 24h duration valid. e60510001ng: change CIK e60510002ng: change CIK e60515000gd: Add a legal right bracket character. e60515004gd, e60515005gd, e60515006gd: Delete e60515007gd to e60515011gd: Update from dei 2009 to 2012 e60515008ng: New variation tests for DOCTYPE in text block body. e60515: Update variations from dei 2011 to 2012 e60516011gd: Provide the jpg image referenced in the text block. e60516015ng: Removed irrelevant nested table e60516016gd: Add a gif and jpg image to the text block. e60516018ng through 21ng: Update variations from dei 2009 to 2012. e60516028ng: New variation checks for undefined entity. e60516030ng: New variation with nested table e60516: Change .gif and .jpg file names to match instances. e60516: Clarify that nested tables are not detected by DTD e60516: Update variations from dei 2011 to dei 2012. e60519: Remove dependence on dei 2009. Edit to Remarks. e60520002ng: Change from dei 2008 to dei 2011 e60520010ng-014ng: Remove variations and edgar-20081231 files. e60520: Many new variations covering additional submission types. e60520: Simplify linkbase files used e60520: Update the submission-to-document type table for dei 2012. e60521: Change document type 'NCSR' to correct value 'N-CSR' e60521: Simplify linkbase files used e60524: change variation names where case-insensitivity is important. e60525: Remove dependence on dei 2009.</p>

Version	Changes
	<p>e60526: Change document type 'NCSR' to correct value 'N-CSR'</p> <p>e60526: Simplify linkbase files used</p> <p>e60534000gd: add a gif to the text block.</p> <p>e60534007ng: New variation testing absent image file</p> <p>e60534008ng: New variation testing invalid image file</p> <p>e60535998gd: New variation testing energy item type</p> <p>e60535999gd: Correct description so it refers to EEK currency.</p> <p>e60535: Edit remarks regarding UTR element triggering validation.</p> <p>e60704008ng: New variation tests for missing authority in namespace with only a date.</p> <p>e60707003ng: New variation tests for missing namespace prefix.</p> <p>e60727: Remove dependence on dei 2009 linkbases.</p> <p>e60728: Remove dependence on dei 2009 linkbases.</p> <p>e60903018ng: New variation tests for ineffectual calculations.</p> <p>e60903: Remove unused namespace prefix declarations.</p> <p>e60903: Variations 000gd, 004ng, 017gd change dei 2008 to 2009.</p> <p>e60909000gd: Remove dependence on dei 2009.</p> <p>e60909: Change use of rr-ent to rr-def</p> <p>e61001: change element labels to avoid spurious LC3 warnings.</p> <p>e61604000gd: Change dependence on rr 2008 to rr 2012.</p> <p>e61604: Change use of rr-ent to rr-def</p> <p>e61605000gd: Change dependence on rr 2008 to dei 2009 schema only</p> <p>e61605000gd: Variation removed, applied only to rr 2008.</p> <p>e61605001ng: Update from dei 2011 to dei 2012</p> <p>e61605031ng: New variation testing absent image file</p> <p>e61605032ng: New variation testing invalid image file</p> <p>e61607003ng: Change dependence on rr 2008 to dei 2009 schema only</p> <p>e61607003ng: Variation removed, applied only to dei 2009.</p> <p>e62201: Remove files from US GAAP 1.0, SOI 2008, RR 2008.</p> <p>e62202: Add files in US GAAP 1.0, SOI 2008, RR 2008.</p> <p>e62203: Remove variations involving US GAAP 1.0, SOI 2008, RR 2008</p>
22-130206	<p>e60306304ng: Correct xpointer reference.</p> <p>e60311: Corrections to testcase file. Remove variations that would be invalid because the XBRL linkbase schema does not allow xml:base attributes to appear.</p> <p>e604030004ng, e60504000gd, e60504002ng, e60507001ng, e60509001gd, e60509002gd, e60509003gd, e60509005ng, e60510007gd, e60519002gd, e60519003gd, e60527000ng, e60527001ng, e60527002ng, e60527003ng, e60527004ng, e60532000ng, e60701000ng, e60535*: align the document period end date with the required context end date.</p> <p>e60504,e60505: Add schemalocation attribute to linkbases.</p> <p>e60534000gd: Change gif image filename.</p> <p>e60903: Add remarks in testcase file concerning 018ng.</p> <p>e60903018ng: Correct typo in testcase file.</p> <p>e60903019ng: Add variation in which arc priorities are equal.</p> <p>e60903020ng: Add variation in which standard arc has lower priority.</p>

Version	Changes
23-130412	<p>Throughout: Update to the dei-2013 schema in any variation that does not depend on some earlier dei version, and remove dei elements EntityInformationCurrentLegalOrRegisteredName and DocumentReportType that were deprecated in 2012.</p> <p>lib/edgartaxonomies.xml: Remove us-gaap Family 2011 version, replace with us-gaap Family 2013 version.</p> <p>e60403021gd: New variation in which a namespace has two schemas.</p> <p>e60403024ng: New variation in which the date 31 November appears.</p> <p>e60403025ng: New variation in which a schema import is missing.</p> <p>e60403026ng: New variation in which xsi:nil is absent from empty fact.</p> <p>e60535000gd: Add units MWh, etc. Add a decimalItemType case.</p> <p>e60535001gd: Add units MWh, etc. Add a decimalItemType case.</p> <p>e60709000gd: Change URI because /role/ and LC3 are unimportant.</p> <p>e60710: Clarify remark to indicate which schema is being referred to.</p> <p>e62201, e62202, e62203, e62204: Retire Family us-gaap 2011.</p>
23-130426	<p>e6040327ng: New variation testing a data type error.</p> <p>e6040328ng: New variation testing a unitRef attribute error.</p> <p>e6040329ng: New variation testing a missing namespace error.</p> <p>e6040330ng: New variation testing a bad footnote xlink:role value.</p> <p>e60528002gd: Correct bad footnote xlink:role value.</p> <p>e60907001ng: Correct reference to us-gaap 2011 element.</p> <p>e62202026ng: Remove conflict between dei-2011 and dei-2013</p> <p>e62202027ng: Remove conflict between dei-2011 and dei-2013</p>
24-130611	<p>e603: Correct typo in assertion elements.</p> <p>e61801, e61802: Remove @xlink:role from reference locators.</p> <p>e62201007gd: New variation testing RXD family files.</p> <p>e623: New cases e62301 through e62309 and e62311 to e62344.</p>
24-130710	<p>e62201003gd: Remove negated-2008-03-31.xsd import</p> <p>e62202: Add negated-2008-03-31.xsd to sample forbidden list</p> <p>e62202: Reduce the number of variations from 54 to 20.</p> <p>e62201007gd: Remove variation.</p> <p>e623: Remove all test cases.</p>
25-131024	<p>errors.xml, errors.htm: Update the error code list for the web site.</p> <p>e60305001ng: Correct build problem resulting in an empty instance.</p> <p>e60905000gd: Update negated-2008 reference to negated-2009.</p> <p>e62202007ng: Remove unnecessary import.</p> <p>e62202011ng: Correct missing namespace attribute on import.</p> <p>e62202013ng: Correct missing namespace attribute on import.</p>

Version	Changes
27-140205	<p>Throughout: Update to the dei-2014 schema in any variation that does not depend on some earlier dei version, update to EFM v27.</p> <p>edgartaxonomies.xml, erxl.xsd: add required "version" attribute to indicate the EFM version, initially 27.</p> <p>edgartaxonomies.xml, externals.txt: Remove 2012 US-GAAP Family version, replace with 2014 US-GAAP Family version.</p> <p>errors.xml, errors.htm: Update with new error codes.</p> <p>e60403011ng: New variation testing context validity.</p> <p>e60504: Correct instances that would otherwise trigger 6.7.31.</p> <p>e60509: Edited all variations to relax the restrictions on contexts of one day and affirm that dimensions in contexts and document type have no impact on this rule.</p> <p>e60510: Removed rule and test cases.</p> <p>e60537: Test new error code for nonzero digit truncation.</p> <p>e60538: Test new error code for contexts using the forever period.</p> <p>e60731: Test new error code for custom fraction item types.</p> <p>e60905000gd: Correct minor typo in testcase file.</p> <p>e61009: Test new error code for numeric label roles.</p> <p>e609*,e610*,e612*,e614*,e616*: Correct usage of a nonnumeric abstract element with a numeric label role.</p> <p>e60507*,e60509*,e60516*,e60712*,e60725*,e60727*, e60905*, e61604*, e61609*: Correct EntityRegistrantName value.</p>
27-140220	<p>doc/chapter6.htm: A subset of file conf/descriptions.htm that contains the draft text chapter 6 for the EFM version.</p> <p>e60520007ng: Correct missing contextRef attribute.</p> <p>e6052202*: Add remark regarding error cascades.</p> <p>e60516*,e60536*, e60703*, e60716*, e62201*, e62202*: remove relative anchor hrefs from the testcase files.</p> <p>e60511*: Remove obsolete remark from testcase.</p> <p>lib/utr.xml, lib/utr.xsd, lib/render.xsl: add UTR files.</p> <p>e60535*: Add new variations to cover units added to UTR 2013-05-17 since UTR 2012-11-30.</p>
27-140327	<p>e60732*: New testcase.</p> <p>lib/errors.xml, lib/xbrlerrors.htm: Correct typos and add error du-0732.</p>
27-140514	<p>e60718000gd: New variation covering the case of a non-xbrl element.</p> <p>e60732021gd: New variation covering the case of a non-xbrl element.</p>

Version	Changes
29-141217	<p>e60306609ng: Remove spurious xlink:role on reference locator.</p> <p>e60311, e60403, e60727, e60903: Remove unnecessary namespace prefix bindings.</p> <p>e60403032ng, e60403033ng, e6040334ng, 6040335gd: New variations to distinguish between floats (can have NaN, INF) and decimal types.</p> <p>e60503002ng: Remove unnecessary variation.</p> <p>e60509007gd: Correct the testcase text so as not to suggest that the result is in some way dependent on the document type.</p> <p>e60509012ng: New variation which seems similar to e60509004ng but receives a different result on some validators.</p> <p>e60526: update us-gaap version from 2013 to 2015.</p> <p>607-testcases.xml and others: Correct to list testcase 607-32.</p> <p>e60731002gd: New variation to confirm that type declaration equivalence is allowed; use of the specific type xbrli:fractionItemType is not.</p> <p>e62201: Update to include us-gaap and exch 2015 schemas.</p> <p>e62202: Update to exclude us-gaap and exch 2013 schemas.</p> <p>e62203: Remove unnecessary variations referencing dei-2012.</p> <p>errors.xml, warnings.xml: Update files to correspond to currently emitted errors and warnings.</p>
31-150505	<p>e62203007gd: Add variation making explicit that dei-2014 can be used with rr-2012.</p> <p>e62201, externals.txt: Update to indicate that country-2012, currency-2012, invest-2012 will continue to be allowed.</p>
31-150529	<p>e60537005ng: Add variation with positive values of the decimals attribute.</p> <p>e62201002gd: Remove erroneous references to 2013 and 2014 schemas.</p>
35-151113	<p>e60306309ng, e60306609ng: remove, because invalid href to reference linkbases cause other EFM errors.</p> <p>e60308: add exhibitType attribute to allow multi-instance testing</p> <p>e60308001ng: New variation to distinguish multiple instance cases.</p> <p>e60310: New test case for EFM section 6.3.10.</p> <p>e60403021gd, e6043035gd: Remove unnecessary axes from presentation linkbase.</p> <p>e60512004ng, e60512006ng: remove, because these variations no longer violate section 6.5.12.</p> <p>e60512009gd, e60512010gd, e60512011gd: add variations illustrating cases where redundant facts are allowed (duplicates having the same values).</p> <p>e60513001ng: Change the C-equal facts so that they are not V-equal.</p> <p>e60516033ng: Add variation clarifying that images on the SEC web site cannot be referenced, only local images, as per EFM page 5-12.</p> <p>e60520: Remove unnecessary axes from presentation linkbases.</p> <p>e60523: Remove variations referencing ratings-2009 files.</p> <p>e607: Correct all element declarations to have capitalized names.</p> <p>e60706000gd: Remove unnecessary axes from presentation linkbases.</p> <p>e60729: Remove unnecessary axes from presentation linkbases.</p> <p>e60903017gd: Remove unnecessary axes from presentation linkbase.</p> <p>e61206: New test case for warning about multiple presentation roots.</p> <p>e61207: New test case for warning about mismatched preferred label</p>

Version	Changes
	<p>roles.</p> <p>e61208: New test case for warning about axis without a domain child.</p> <p>e61209: New test case for warning about incomplete unit ordering.</p> <p>e61405012gd: Correct warning about multiple presentation roots.</p> <p>e62203: Remove unnecessary axes from presentation linkbases.</p> <p>e62601: New test case for warning about all facts being filtered.</p> <p>e62602: New test case for warning about incomplete instant - duration -instant fact patterns.</p> <p>e62603: New test case for warning about incomplete statements of changes in equity.</p> <p>e62604: New test case for errors in embedding command syntax.</p> <p>e62605: New test case for errors in missing rows or columns of embedding commands.</p> <p>e62606: New test case for warning about incomplete ordering of rows and column axes in an embedding command.</p> <p>e62607: New test case for warning about empty bar chart commands.</p> <p>e62608: New test case for warning about too many bar chart facts.</p> <p>e62609: New test case for warning about {Elements} token and primary axis on rows.</p> <p>e902: Test cases with variations specific to Form SDR in subfolders 60302, 60308, and 60524.</p>
35-151218	<p>errors.xml: Update with error codes for multiple SDR attachments.</p> <p>e60305006ng: Add variation testing for XML BOM.</p> <p>e605...e626: Correct -testcase.xml files to match page and section numbers, and edit to match latest EFM v35.</p> <p>e60524: Correct file names in variations 004 and 005.</p> <p>e61207: Remove spurious edgar-* linkbases from testcase.</p> <p>624-rendering, 624-rr-rendering: Add new samples that exercise each rendering feature described in EFM sections 6.24 and 6.25.</p> <p>626-rendering-syntax: Add new test cases to exercise rendering syntax errors and warnings.</p> <p>902-sdr/60302: correct CIK and doc types on the first and second L SDR attachments so as not to raise errors unrelated to 6.3.2.</p> <p>902-sdr/60524: New test case and variations for detecting inconsistent CIK and registrant names in multiple L SDR attachments.</p> <p>902-sdr/62421: New test case specific to multiple SDR attachments.</p> <p>902-sdr: remove txt and xml files not needed for validation.</p>
35-160213	<p>e62604007gd: New variation checking for tildes with nothing between.</p> <p>622: Update references to 2016 taxonomies.</p> <p>624: Update references to 2016 taxonomies.</p> <p>605-07: Update references to 2016 taxonomies.</p> <p>605-26: Update references to 2016 taxonomies.</p> <p>607-16: Update references to 2016 taxonomies.</p> <p>607-27: Update references to 2016 taxonomies.</p> <p>612-09: Update references to 2016 taxonomies.</p> <p>902-sdr/60302, 60308, 60524, 62421): Update references to 2016.</p> <p>625-rr/01: Update references to 2016 taxonomies.</p>